

REACTOR FOR CULTURING CELLS OR MICROORGANISMS OR FOR
DISSOLVING OR SUSPENDING A POWDER IN A LIQUID MEDIUM

BACKGROUND

*OK to
BHE
7/29/04
LBS*

[0001] The present invention relates to a reactor for culturing cells or microorganisms, or for dissolving or suspending a powder in a liquid medium. In particular, the present invention relates to biotechnology, and specifically, the pharmaceutical industry in which cell cultures and cultures of microorganisms are regularly used as a means of producing therapeutic molecules, and the manufacture of medicaments, the agri-foodstuff and cosmetic fields.

[0002] Cultures of microorganisms such as bacteria, fungi and yeasts are normally produced in bioreactors of large volume allowing mass production on an industrial scale. Plant cell cultures are produced instead in apparatuses of small volume and still remain at the present time at the development stage since the production cost hinders their extension.

[0003] The culturing of animal and human cells constitutes at the present time one of the major thrusts in the pharmaceutical industry, as they allow new therapeutic approaches, such as gene therapy, to be implemented.

[0004] This is because these cell cultures are used either as the actual essence of the medicament within the context of cell therapy or as a means of producing viral vectors used in gene therapy.

[0005] Cell therapy consists in removing certain cell populations from a patient so as to cultivate them and reinject them so as to reestablish or accentuate a particular activity.